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PATENT

Docket No. 1377-0137P

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

APPLICANTS:	John Kevin Collins *et al.*	
APPLN. NO.:	09/367,105	GROUP: 1651
FILED:	November 10, 1999	EXAMINER: I. Marx
FOR:	PROBIOTIC STRAINS FROM LACTOBACILLUS SALIVARIUS AND ANTIMICROBIAL AGENTS OBTAINED THEREFROM	

DECLARATION UNDER 37 C.F.R. § 1.32

Assistant Commissioner of Patents

Washington, DC 20231

Sir:

I, John Bienenstock, a Canadian citizen, of Departments of Medicine, Pathology and Molecular Medicine, McMaster University, 1200 Main Street West, Rm 3N26, Hamilton, ON, L8S 3Z5, Canada. I have taken early retirement from the University, however, I hold an honorific title which is "University Professor" that entitles me to a life-time appointment and full privileges of retaining my research and other activities. I am still a Professor of Medicine, Pathology and Molecular Medicine. My *Curriculum Vitae* is attached hereto. I do solemnly and sincerely declare as follows:

1. I have read the Office Action dated June 19, 2001, each of the three cited references and a copy of the specification of the above U.S. Application.

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2. I have also read a draft of the Declaration to be made by Dr. Liam O'Mahony by way of response and I fully agree with the statements contained in that Declaration as regards the cited references relied on by the Examiner.

3. In my view that novel and inventive approach taken by Collins *et al.* to isolate *Lactobacillus salivarius* strains with potential application to human healthcare was unprecedented.

4. The stains of *Lactobacillus salivarius* isolated by Collins *et al.* from appendices and sections of the large and small intestine of the human gastrointestinal tract obtained during reconstructive surgery represents a significant departure from previous methods for isolating probiotic bacteria.

I hereby declare that all statements made herein of my own knowledge are believed to be true, and further that these statements were made with the knowledge that willful false statements and the like so made are punishable by fine or imprisonment, or both, under Section 1001 of Title 18 of the United States Code and that such willful false statements may jeopardize the validity of the Application or any patent issued thereon.

Dec 10 '01 — Date

John Bienenstock

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St. Paul's School, London, U.K.	
M.B.B.S.	1960
King's College, London University and	
Westminster Hospital Medical School, London, U.K.	
M.R.C.P.	1964
F.R.C.P.(C)	1976
F.R.C.P.	1980
F.R.S.(C)	1992
M.D. (Honoris Causa), Göteborg, Sweden	1998

Summary of Accomplishments

John Bienenstock is an internationally known physician and scientist and a Fellow of the Royal Society of Canada. He received his internal medicine training in various teaching hospitals in London, UK. In 1964, he went to Boston on a USPHS Fellowship and worked in the Lovett Memorial Group at the Massachusetts General Hospital with Dr. Kurt Bloch. He acted clinically as a rheumatologist while studying immunology in association with, amongst others, Dr. Frank Austen. In 1966, Dr. Bienenstock went to the State University of New York at Buffalo to take up an appointment with Dr. Tom Tomasi to work on mucosal immunology. Here, he acted from a clinical point of view as a consultant on the wards in internal medicine, and pursued his research. He received a Buswell Fellowship and became an Assistant Research Professor in Medicine. In 1968, he went to McMaster University, where he has been ever since, pursuing a clinical, research and administrative career.

At McMaster, from an administrative point of view, he was the first Chair of the Committee on Scientific Development, the forerunner of the current Associate Dean, Research position. In this role, he oversaw the early development of multi-disciplinary research programmes, the distribution of space according to research function and the early developments of research at McMaster in the Faculty of Medicine.

From 1971 to 1978 he was the founding Director of the Host Resistance Programme, a multi-disciplinary research program involving immunology and virology. He became Chair of the Department of Pathology in 1978 and from this time until he stepped down in 1989, he oversaw major development and expansion of this department into the premier basic science department in the Faculty, and one of the best in the world.

Dr. Bienenstock is a clinical immunologist and administered the development of the Clinical Immunology programme at McMaster, which has Royal College accreditation. He was responsible as Chair of Pathology for the maintenance and development of the Regional Laboratory Programme, a unique, co-ordinated laboratory programme which provides laboratory diagnostic services including clinical chemistry, hematology, anatomic pathology and microbiology for the six sites of the two teaching hospitals in the Hamilton-Wentworth Region.

In 1989, he became the Vice-President for Health Sciences and in 1992 undertook the role of the Dean and Vice-President Health Sciences, a Faculty which expanded to include medicine, occupational and physiotherapy, nursing, midwifery and graduate studies. He stepped down

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from these positions i 997 at which time the overall budget v $125 million. During his tenure as Dean, he served as Chair of the Council of Ontario Faculties of Medicine. He oversaw an expansion of the role of the Faculty in healthcare, improved the research position in terms of international acclaim, introduced Midwifery, Physiotherapy and Occupational Therapy into the Faculty's educational and research programs, and gained approval of the government to fund a $30 million building development to house the Institute of Applied Health Sciences, a joint program between the Faculty and Mohawk College. Most recently he was responsible for awards of $22 million from the Canadian Foundation for Innovation towards the cost of several large research infrastructure projects in mental health, respirology and molecular biology which include major equipment and construction. The total package for this with matching funds from St. Joseph's Hospital and the Province of Ontario was over $50 million.

From a research standpoint, Dr. Bienenstock held a continuous operating research grant from the Medical Research Council of Canada from 1968 to 1999. He has published more than 380 peer reviewed articles and other publications. He has authored, edited and co-edited several books including the standard text on mucosal immunology, now in its second edition. He is known best for his work in mucosal immunity in which he pioneered the concept of a common mucosal immune system and developed the first full description of bronchus associated lymphoid tissue and its involvement in the mucosa associated lymphoid tissue system of the body. His more recent work has related to an elucidation of mechanisms of allergy, mucosal immunology, and most particularly, the interactions between mast cells and other cells of the immune system with the nervous system.

Dr. Bienenstock is a frequent speaker at symposia and plenary sessions around the globe and has organized a number of successful international conferences on a wide variety of subjects. He has served as President of the Canadian Society of Immunology, the International Society for Mucosal Immunology and is currently the President of the Collegium Internationale Allergologicum. He acts regularly as an external consultant to public sectors, and in this capacity was invited by the Government of Australia to review the complete operation of the National Health and Medical Research Council. This resulted in the overhaul and restructuring of the Council's organization and operations. He has similarly reviewed the research operations of the Universities of Sydney, Australia, and Göteborg, Sweden and recently (2000), completed a review of Public Health for the Karolinska Institute, Stockholm, Sweden. He acts as a consultant to venture capital groups, foundations and especially the pharmaceutical industry in his area of expertise. He chairs the Scientific Advisory Board of International Medical Innovations, Inc and a new Western Australian Biotechnology startup, Vasse Research. He serves on the Board of ProMetic Life Sciences, Inc. and was the founder of two companies in the Biotechnology Sector. He acted from 1996-99 as Chief Scientific Officer for a UK based company, OraTol Inc., involved in oral immunotherapeutic approaches to allergy and asthma.

Dr. Bienenstock has served in a voluntary capacity on a number of Boards, including that of the Canadian Red Cross Society who awarded him the order of the Red Cross in 1990. He was also Chair of the Board of the Dundas Valley School of Art, on the Board of the Hamilton Art Gallery and is an accomplished artist and a member of the Society of Canadian Artists. He received the Finkelstein Prize from the Crohn's and Colitis Foundation of Canada in 1996 and was accorded the honour of University Professor in 1997 by McMaster University, and an MD degree (Honoris Causa) by the University of Göteborg, Sweden in 1998.

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DECLARATION UNDER 37 C.F.R. § 1.32

Assistant Commissioner of Patents

Washington, DC 20231

Sir:

I, Atte von Wright, a Finnish citizen, am presently employed at the University of Kuopio, PO Box 1627, FIN-70211, Kuopio, Finland, where I am a Professor of Nutrition and Food Biotechnology. My *Curriculum Vitae* is attached hereto. I do solemnly and sincerely declare as follows:

1. I have read the Office Action dated June 19, 2001, each of the three cited references and a copy of the specification of the above U.S. Application.

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2. I have also read a draft of the Declaration to be made by Dr. Liam O'Mahony by way of response and I fully agree with the statements contained in that Declaration as regards the cited references relied on by the Examiner.

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I hereby declare that all statements made herein of my own knowledge are believed to be true, and further that these statements were made with the knowledge that willful false statements and the like so made are punishable by fine or imprisonment, or both, under Section 1001 of Title 18 of the United States Code and that such willful false statements may jeopardize the validity of the Application or any patent issued thereon.

December 12, 2001 — Date

Atte von Wright — Atte von Wright

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Curriculum Vitae

Family name: Von Wright
Christian names: Atte Johannes
Date and Place of Birth: February 27, 1952, Kuopio, Finland
Social security number: 270252-157H
Marital status: Married with three children (22,19 and 15 years)

Current position: Professor of Nutritional and Food Biotechnology, Institute of Applied Biotechnology, University of Kuopio, from January 1 st, 2000 onwards.

Education and training:

- Matriculation examination, May 31, 1971, Kuopion lyseo, Kuopio, Finland
- Graduated from the University of Helsinki, Helsinki, Finland, on November 11, 1975 with General Microbiology as the main subject

Post graduate studies:

- Degree of Licentiate of Philosophy, University of Helsinki, May, 25, 1978
- PhD, University of Sussex, England, July 21, 1981 (Thesis *The resposnse of Escherichia coli to DNA damage*, supervisor Professor Bryn A. Bridges)

Special courses:

- Basic university course in Mathematics (approbatur level), University of Helsinki, 1988
- Basic university course in Computer Science (approbatur level), University of Kuopio, Kuopio, Finland, 1990
- Basic university course in Physics (approbatur level), University of Kuopio, Finland, 1995
- Special training course in Gene Technology, University of Helsinki (October 29 - November 16, 1984)
- Genetic Manipulation of Streptomyces, European Molecular Biology Organization-Course, John Innes Institute, Norwich, England; July 14-28, 1990
- Comett II, Modern Biotechnological Tools in Industrial Research and Development, Module V: Microbial Physiology and Industrial Fermentation, January 24-28, 1994, Technical University of Denmark, Lyngby, Denmark

Scientific interests:

- Genetic toxicology and mechanisms of mutagenesis
- Genetics and molecular biology of lactic acid bacteria
- Natural bioactive compounds
- Probiotics and prebiotics
- Food safety and hygiene

Visits:

- TNO-Centraal Instituut voor Voedingsonderzoek, Zeist, The Netherlands; Trainee January 1st-May, 15; 1977
- University of Sussex, MRC Cell Mutation Unit, Sussex, England; Post-graduate student; November 1st, 1978 - November 15, 1980
- The Public Health Research Laboratory of The City of New York, and Department of Food Microbiology, University of Minnesota, Minneapolis-St.Paul; Visiting scientist, August 4, 1983 - April 30, 1984
- The Royal Veterinary and Agricultural University of Denmark, Dept. of Dairy and Food Science, Frederiksberg, Denmark; Temporary Associate Professor July 1st, 1992-June 30, 1993.

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Previous appointmen.

- Scientist in Technical Research Centre of Finland (VTT), Food Research Laboratory, September 1976 - April 1983, specializing in the genetic toxicology of foods.
- Senior Scientist in The Reserarch and Development Centre of Valio Finnish Cooperative Dairies' Association specializing in the gene technology of lactic acid bacteria; May 1983 - April 1989.
- Senior Research Fellow in University of Kuopio, Dept. of Pharmaceutical Chemistry specializing in the bioactive compounds of microbial origin; May 1989 - August 1995 (with one year absent because of the visit to the Royal Veterinary and Agricultural University of Denmark)
- Senior Research Scientist (Group Manager from January 1996 onwards) in VTT Biotechnology and Food Research, September 1995 - July 1998.
- Planning Professor, University of Kuopio, Department of Biochemistry and Biotechnology with a special task to plan a new academic curriculum (Nutrition and Food Biotechnology). Located from January 1st 1999 onwards in a new department, Institute of Applied Biotechnology. August 1998 - December 1999

Functions as a teacher:

- Docent (Senior reader) in general microbiology, University of Helsinki, Department of General Microbiology, May 1982 onwards
- Docent in microbial genetics, University of Kuopio, Department of Biochemistry and Biotechnology, October 1st, 1990 - March 31, 1996
- Docent in the biotechnology of microbial bioactive compounds, University of Kuopio, Department of Pharmaceutical Chemistry, April 1st, 1996 onwards

Supervision of completed PhD projects:

- **Stephen Wessels**, 1993, Food grade genetic modification of of dairy bacteria (The Royal Veterinary and Agricultural University, Frederiksberg, Denmark)
- **Soile Tynkkynen**, 1994, Molecular characterization of the oligopeptide transport system of *Lactococcus lactis* (University of Helsinki)
- **Jussi Holmalahti**, 1998, Further characterization of antitumour antibiotics from *Streptomyces* strains (University of Kuopio)
- **Anne Gravesen**, 1996, Replication and incompatibility of lactococcal theta-replicating plasmids (The Royal Veterinary and Agricultural University, Frederiksberg, Denmark)
- **Pia Kontula**, 1999, *In vitro* and *in vivo* characterization of potential probiotic lactic acid bacteria and prebiotic carbohydrates (University of Helsinki)

Supervised also four Finnish Licentiate of Philosophy thesis, and twenty Finnish graduation projects. Acted as a referee for eleven Finnish PhD-thesis and as an external examiner ("opponent") for one Swedish, one Irish, one Dutch and six Finnish PhD-thesis.

Expert functions:

Expert of the Finnish Ministery of Agriculture and Forestry for the evaluation of microbial feed additives
Member of the EU DGXII Scientific Committee on Animal Nutrition (SCAN), from November 1997 onwards.
Member of the Finnish Novel Food Board from 2000 onwards

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Publications:
Altogether 63 accepted original research articles and twelve reviews in international refereed publications. Acted both as a writer and an editor for four textbooks, two of which are in international circulation. In addition there are 19 reviews, research reports, and short research papers in Finnish perioidicals and textbooks, as well as five patents.

December 12, 2001

Atte von Wright
University of Kuopio
Institute of Applied Biotechnology
P.O.Box 1627, FIN-70211 Kuopio, Finland
Phone: +358-17-162087, Fax: +358-17-163322
e-mail: Atte.vonWright @uku.fi

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ATTE von WRIGHT

List of Publications

1. Scientific Publications

1. **Atte von Wright, Aimo Niskanen and Heikki Pyysalo**: The toxicities and mutagenic properties of ethylidene gyromitrin and N-methylhydrazine with *Escherichia coli* as test organism. **Mutation Research** (1977) 56:105-110.

2. **Atte von Wright, Aimo Niskanen, Heikki Pyysalo and Heikki Korpela**: The toxicity of some N-methyl-N-formylhydrazones and related compounds in mice and microbial tests. **Toxicology and Applied Pharmacology** (1978) 45:429-434.

3. **Atte von Wright, Aimo Niskanen and Heikki Pyysalo**: Mutagenic properties of ethylidene gyromitrin and its metabolites in microsomal activation tests and in host-mediated assay. **Mutation Research** (1978) 54:167-173.

4. **Atte von Wright, Heikki Pyysalo and Aimo Niskanen**: Quantitative evaluation of the metabolic formation of methylhydrazine from acetaldehyde- N-methyl-N-formylhydrazone, the main poisonous compound of *Gyromitra esculenta*. **Toxicology Letters** (1978) 35: 261-265.

5. **Seppo Lindroth and Atte von Wright**: Comparison of the toxicities of patulin and patulin adducts formed with cysteine. **Applied and Environmental Microbiology** (1978) 58: 1003-1007.

6. **Atte von Wright and Seppo Lindroth**: The lack of mutagenic properties of patulin and patulin adducts formed with cysteine in Salmonella test system. **Mutation Research** (1978) 58:211-215.

7. **Atte von Wright and Leena Tikkanen**: The comparative mutagenicities of hydrazine and its mono- and dimethyl derivatives in bacterial test systems. **Mutation Research** (1980) 78: 17-23.

8. **Atte von Wright and Leena Tikkanen**: Hydrazine and methylhydrazine as *recA*$^+$ independent mutagens in *Escherichia coli* . **Mutation Research** (1980) 71: 269-271.

9. **Atte von Wright and Bryn A. Bridges**: Mutagenesis of lambda phage by *tif*-expression or host irradiation functions is largely independent of damage in phage DNA. **Mutation Research** (1980) 74:325-328

10. **Atte von Wright and Bryn A. Bridges**: Effect of *tif*-expression, irradiation of the recipient and presence of plasmid pKM101 on recovery of a marker from a donor exposed to ultraviolet light prior to conjugation. **Journal of General Microbiology** (1980) 119: 327-331.

11. **Atte von Wright and Bryn A. Bridges**: Effect of *gyrB* mediated changes in chromosome structure on killing of *Escherichia coli* by ultraviolet light: Experiments with strains differing in deoxyribonucleic acid repair capacity. **Journal of Bacteriology** (1981) 146: 18-23.

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12. **Bryn A. Bridges and Atte von Wright**: Influence of mutations at the *rep* gene on the survival of *Escherichia coli* following ultraviolet light irradiation or 8-methoxypsoralen photosensitization. **Mutation Research** (1981) 82:229-238.

13. **Atte von Wright**: Hydrazine and methylhydrazine as *recA*$^+$ independent mutagens in *Escherichia coli*. **Chromosome Damage and Repair**, Proceedings of EMBO Lecture Course in Bergen, May 27-June 5, 1980. Plenum Press (1981) 517-520.

14. **Atte von Wright, Aimo Niskanen, Heikki Pyysalo and Heikki Korpela**: Amelioration of the toxic effects of ethylidene gyromitrin (false morel poison) with pyridoxine chloride. **Journal of Food Safety** (1981) 3:199-203.

15. **Jorma Knuutinen and Atte von Wright**: The mutagenicity of *Lactarius* mushrooms. **Mutation Research** (1982) 103:115-118.

16. **Atte von Wright, Jorma Knuutinen, Seppo Lindroth, Markku Pellinen, Karl-Gustav Widen and Eeva-Liisa Seppä** (1982) The mutagenicity of some edible mushrooms in Ames test. **Food and Chemical Toxicology** (1982) 20: 265-267.

17. **Karin Autio, Atte von Wright and Heikki Pyysalo**: The effect of oxidation of the sulfur atom on the mutagenicity of ethylenethiourea. **Mutation Research** (1982) 106:27-31.

18. **Tapani Suortti and Atte von Wright**: Isolation of a mutagenic fraction from aqueous extracts of the wild mushroom *Lactarius necator* (a preliminary note). **Journal of Chromatography** (1983) 285:529-532.

19. **Tapani Suortti, Atte von Wright and Ari Koskinen**: Necatorin, a highly mutagenic compound from *Lactarius necator*. **Phytochemistry** (1983) 22:2873-2874.

20. **Atte von Wright and Tapani Suortti** : Preliminary characterization of the mutagenic properties of "necatorin", a strongly mutagenic compound of the mushroom *Lactarius necator*. **Mutation Research** (1983) 121:103-106.

21. **Raija Kallonen, Atte von Wright, Leena Tikkanen and Kirsti Kaustia**: The toxicity of fire effluents from textiles and upholstery materials. **Journal of Fire Sciences** (1985) 3:145-160.

22. **Atte von Wright, Anna-Maija Taimisto and Seppo Sivelä**: Effect of Ca^{2+} ions on plasmid transformation of *Streptococcus lactis* protoplasts. **Applied and Environmental Microbiology** (1985) 50:1100-1102.

23. **Atte von Wright, Martin Suominen and Seppo Sivelä** : Identification of lactose fermentation plasmids of streptococcal dairy starter strains by Southern hybridization. **Letters in Applied Microbiology** (1986) 2:73-76.

24. **Atte von Wright and Soile Tynkkynen**: Construction of *Streptococcus lactis* subsp. *lactis* strains with a single plasmid associated with mucoid phenotype. **Applied and Environmental Microbiology** (1987) 53:1385-1386.

25. **Atte von Wright, Soile Tynkkynen and Martin Suominen** : Cloning of a *Streptococcus lactis* subsp. *lactis* chromosomal fragment asociated with the ability to grow in milk. **Applied and Environmental Microbiology** (1987) 53:1584-1588.

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26. **Atte von Wright**: Experiments on the genetics of arsenate resistance in lactic acid streptococci. **Meijeritieteellinen aikakauskirja** (1987) XLV:43-48.

27. **Soile Tynkkynen and Atte von Wright**: Characterization of a cloned chromosomal fragment associated with the ability to grow in milk. **Biochimie** (1988) 70: 531-534.

28. **Soile Tynkkynen, Atte von Wright and Eeva-Liisa Syväoja**: Pepetide utilization coded by *Lactococcus lactis* subsp. *lactis* chromosomal DNA. **Applied and Environmental Microbiology** (1989) 55.2690-2695.

29. **Atte von Wright, Stephen Wessels, Soile Tynkkynen and Maria Saarela** : Isolation of a replication region of a large lactococcal plasmid and use in cloning of a nisin resistance determinant. **Applied and Environmmental Microbiology** (1990) 56:2029-2035.

30. **Mervi Sibakov, Teija Koivula, Atte von Wright and Ilkka Palva**: Secretion of TEM-ß-lactamase with signal sequences isolated from the chromosome of *Lactococcus lactis* subsp. *lactis* . **Applied and Environmental Microbiology** (1991) 57:341-348.

31. **Atte von Wright, Olavi Raatikainen, Hannu Taipale, Sirpa Kärenlampi and Jorma Mäki-Paakkanen:** Directly acting geno- and cytotoxic agents from a wild mushroom *Dermocybe sanguinea* . **Mutation Research** (1992) 269: 27-33.

32. **Weng Hua Ling, Osmo Hänninen, Hannu Mykkänen, M. Heikura, Seppo Salminen and Atte von Wright**: Colonization and fecal enzyme activities after oral Lactobacillus GG administration in elderly nursing home residents. **Annals of Nutrition and Metabolism** (1992) 36: 162-166.

33. **Jussi Holmalahti, Olavi Raatikainen and Atte von Wright**: Transformable mutants of a biopesticide strain *Streptomyces griseoviridis* K61. **Journal of Industrial Microbiology** (1993) 11:193-198.

34. **Atte von Wright and Kaj Räty**: The nucleotide sequence for the replication region of pVS40, a lactococcal food grade cloning vector. **Letters in Applied Microbiology** (1993) 17:25-28.

35. **Atte von Wright and Maria Saarela**: A variant of the staphylococcal chloramphenicol resistance plasmid pC194 with enhanced ability to transform *Lactococcus lactis* subsp. *lactis*. **Plasmid** (1994) 31:106-110.

36. **Jussi Holmalahti, Atte von Wright and Olavi Raatikainen**: Variations in the spectra of biological activities of actinomycetes isolated from different soils. **Letters in Applied Microbiology** (1994) 18:144-146.

37. **Päivi Kopponen, Riitta Törrönen, Jorma Mäki-Paakkanen, Atte von Wright and Sirpa Kärenlampi**: Comparison of CYP1A1 induction and genotoxicity in vitro as indicators of potentially harmful effects of environmental samples. **Archives of Toxicology** (1994) 68:167-173.

38. **Kaj Räty, Olavi Raatikainen, Jussi Holmalahti, Atte von Wright, Susanna Joki A. Pitkänen, Veijo Saano, A. Hyvärinen, Aino Nevalainen and Ilona Buti**: Biological activities of actinomycetes and fungi isolated from the indoor air of problem houses. **International Biodeterioration & Biodegradation**. (1995) 143-154.

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39. **Anne Gravesen, Jytte Josephsen, Atte von Wright and Finn K. Vogensen:** Characterization of the lactococcal theta-replicating plasmid pJW563. **Plasmid** (1995) 34:105-118.

40. **Antti Poso, Atte von Wright and Jukka Gynther:** An empirical and theoretical study on mechanisms of mutagenic activity of hydrazine compounds. **Mutation Research** (1995) 332: 63-71.

41. **Timo Rusanen, Boleslaw Suchocki, Tomasz Twardowski and Atte von Wright.** The perception of genetechnology among high school students in Finland and in Poland. **Biotechnologia** (1996) 32:106 - 116.

42. **Jussi Holmalahti, Jorma Mäki-Paakkanen, Lauri Kangas and Atte von Wright :** Genotoxicity of dihydroabikoviromycin, a secondary metabolite of *Streptomyces anulatus*. **Mutation Research** (1996) 368:157-163

43. **Jussi Holmalahti, Susanna Junttila and Atte von Wright:** Rapid detection of DNA-binding compounds from *Streptomyces xanthochromogenes*. **Letters in Applied Microbiology** (1996) 23:231-233.

44. **Minna Alander, Riitta Korpela, Maija Saxelin, Terttu Vilpponen-Salmela, Tiina Mattila-Sandholm and Atte von Wright:** Recovery of *Lactobacillus rhamnosus* GG from human colonic biopsies: Preliminary results. **Nutrition Today Supplement** (1996) 31: 47S-48S

45 **Minna Alander, Riitta Korpela, Maija Saxelin, Terttu Vilpponen-Salmela, Tiina Mattila-Sandholm and Atte von Wright:** Recovery of *Lactobacillus rhamnosus* GG from human colonic biopsies **Letters in Applied Microbiology** (1997) 24:361-364

46. **Jussi Holmalahti, Harri Santa, Hartmut Laatsch and Atte von Wright:** Comparison of the lethal effects of different Actinomycins on a repair-deficient strain of *Escherichia coli* **Mutation Research** (1997) 391: 33 - 38

47. **Anne Gravesen, Atte von Wright, Jytte Josephsen and Finn K. Vogensen:** Replication regions of two pairs of incompatible lactococcal theta-replicating plasmids. **Plasmid** (1997) 38: 115 -127

48. **Mona Arnold, Arja Reittu, Atte von Wright, Pertti Martikainen and Marja-Liisa Suihko:** Bacterial degradation of styrene in waste gases using a peat filter. **Applied Microbiology and Biotechnology** (1997) 48: 738-744.

49. **Reetta Satokari, Riikka Juvonen Atte von Wright and Auli Haikara:** Detection of *Pectinatus* beer spoilage organisms by polymerase chain reaction. **Journal of Food Protection** (1997) 60: 1571-1573.

50. **Jussi Holmalahti, Olavi Raatikainen, Atte von Wright, Hartmut Laatsch, Anders Spohr, Olav K. Lyngberg and Jens Nielsen:** Production of dihydroabikoviromycin by *Streptococcus anulatus*. Production parameters and chemical characterization of genotoxicity. **Journal of Applied Microbiology** (1998) 85:61-68.

51. **Pia Kontula, Johanna Jaskari, Lode Nollet, Ingrid de Smet, Atte von Wright, Kaisa Poutanen and Tiina Mattila-Sandholm:** The colonization of the Simulated Human Intestinal Microbial Ecosystem (SHIME) by a probiotic strain fed in a fermented oat

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product: Effects on the gastrointestinal microbiota. **Applied Microbiology and Biotechnology** (1998) 50: 246-252.

52. **Ilkka Helander, Hanna-Leena Alakomi, Kyösti Latva-Kala, Tiina Mattila-Sandholm, Irene Pol, Eddy J. Smid, Leon G.M. Gorris and Atte von Wright:** Characterization of the action of selected essential oil components on Gram-negative bacteria. **Journal of Agricultural and Food Chemistry** (1998) 46: 3590-3595

53. **Pia Kontula, Atte von Wright and Tiina Mattila-Sandholm.** Oat bran ß-gluco- and xylo-oligosaccharides as fermentative substrates for lactic acid bacteria. **International Journal of Food Microbiology** (1998) 45:163-169

54. **Minja Miettinen, Minna Alander, Atte von Wright, Jaana Vuopio-Varkila, Philippe Marteau, Josh Huis in't Veld and Tiina Mattila-Sandholm:** The survival of and cytokine induction by lactic acid bacteria after passage through a gastrointestinal model. **Microbial Ecology in Health and Disease** (1998) 10: 141-147.

55. **Pia Kontula, Marja-Liisa Suihko, Atte von Wright and Tiina Mattila-Sandholm.** The effect of lactose derivatives on intestinal lactic acid bacteria. **Journal of Dairy Science** (1999) 82: 249-256.

56. **Minna Alander, Ingrid de Smet, Atte von Wright and Tiina Mattila-Sandholm:** The effect of probiotic strains on the microbiota of the Simulator of the Human Intestinal Microbial Ecosystem (SHIME). **International Journal of Food Microbiology** (1999) 46: 71-80.

57. **Reetta Satokari, Riikka Juvonen, Kirstie Mallison, Atte von Wright and Auli Haikara:** Detection of beer spoilage bacteria *Megasphaera* and *Pectinatus* by polymerase chain reaction and colorimetric microplate hybridization. **International Journal of Food Microbiology** (1998) 45: 119-127.

58. **Minna Alander, Reetta Satokari, Riitta Korpela, Maija Saxelin, Terttu Vilpponen-Salmela, Tiina Mattila-Sandholm and Atte von Wright:** Persistence of colonization of human colonic mucosa by a probiotic strain *Lactobacillus rhamnosus* GG after oral consumption. **Applied and Environmental Microbiology** (1999) 65: 351-354.

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